

Amendments to the Claims:

A clean version of the entire set of pending claims, including amendments thereto, is submitted herewith per 37 CFR 1.121(c)(3). This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

1-2. (Canceled)

3. (Currently Amended) A method comprising:

transmitting a respective telephone number from a network troubleshooting center (NTC) to a plurality of network analyzers (NAs) monitoring respectively corresponding communication lines through which Voice-over-Internet Protocol (VoIP) data streams are transmitted; and

after receiving the telephone number, collecting quality of service data by the NAs for data streams associated with a telephone call having the telephone number as a source or destination and transmitted through the communication lines, and providing quality of service information by the NAs to the NTC based on the collected quality of service data;

~~— further comprising, before the step of collecting quality of service data, the step of:~~

~~— after receipt of the telephone number, monitoring call control information by each NA on the corresponding communication line in accordance with the telephone number to try to identify a data stream associated with a telephone call having the telephone number as a source or destination;~~

~~— transmitting, by a first NA of the NAs to identify the data stream, identifying information of the identified data stream to the NTC; and~~

~~— after receipt of the transmitted identifying information, communicating between the NTC and the NAs so that each NA has the identifying information, collects quality of service data for data streams associated with the telephone call and transmitted~~

through the communication lines, and provides quality of service information to the NTC based on the collected quality of service data.

4-5. (Canceled)

6. (Original) A method as in claim 3, wherein the telephone call is based on Session Initialization Protocol (SIP).

7. (Previously Presented) A method comprising:

transmitting a respective telephone number from a network troubleshooting center (NTC) to network analyzers (NAs) monitoring respectively corresponding communication lines through which Voice over Internet Protocol (VoIP) data streams are transmitted;

after receipt of the telephone number, monitoring call control information by each NA on the corresponding communication line in accordance with the received information to try to identify a data stream associated with a telephone call having the telephone number as a source or destination;

transmitting, by a first NA of the NAs to identify a data stream, identifying information of the identified data stream to the NTC;

after receipt of the transmitted identifying information, transmitting a message from the NTC to the NAs to cause the NAs to stop trying to identify a data stream associated with the telephone call, and providing the identifying information to the NAs; and,

after receipt of the message from the NTC, and in accordance with the identifying information provided by the received message, collecting quality of service data by the NAs for data streams associated with the telephone call and transmitted through the communication lines, and providing quality of service information by the NAs to the NTC based on the collected quality of service data.

8. (Original) A method as in claim 7, wherein the telephone call is based on

Session Initialization Protocol (SIP).

9-10. (Canceled)

11. (Currently Amended) An apparatus comprising:
a network troubleshooting center (NTC) for transmitting a telephone number;
and
a plurality of network analyzers (NAs) for monitoring respectively
corresponding communication lines through which Voice over Internet Protocol
(VoIP) data streams are transmitted,
wherein, after receiving the telephone number, the NAs collect quality of
service data for data streams associated with a telephone call having the telephone
number as a source or destination and transmitted through the communication lines,
and provide quality of service information to the NTC based on the collected quality
of service data, and wherein:
~~the NTC transmits a respective telephone number to the NAs;~~
~~after receipt of the transmitted information, each NA monitors call control~~
~~information on the corresponding communication line in accordance with the received~~
~~information to try to identify a data stream associated with a telephone call having the~~
~~telephone number as a source or destination;~~
~~a first NA of the NAs to identify a data stream transmits identifying information~~
~~of the identified data stream to the NTC; and~~
~~after receipt of the transmitted identifying information, the NTC communicates~~
~~with the NAs so that each NA has the identifying information, collects quality of~~
~~service data for data streams associated with the telephone call and transmitted~~
~~through the communication lines, and provides quality of service information to the~~
~~NTC based on the collected quality of service data.~~

12-13. (Canceled)

14. (Original) A method as in claim 11, wherein the telephone call is based on Session Initialization Protocol (SIP).

15-16. (Canceled)

17. (Currently Amended) An apparatus comprising:

means for transmitting a respective telephone number from a network troubleshooting center (NTC) to network analyzers (NAs) monitoring respectively corresponding communication lines through which Voice over Internet Protocol (VoIP) data streams are transmitted;

means for, after receipt of the telephone number, monitoring call control information by each NA on the corresponding communication line in accordance with the received information ~~to try to identify a data stream associated with a telephone call having the telephone number as a source or destination;~~

means for transmitting, by a first NA of the NAs to identify a data stream associated with a telephone call having the telephone number as a source or destination, identifying information of the identified data stream to the NTC;

means for, after receipt of the transmitted identifying information, transmitting a message from the NTC to the NAs to cause the NAs to stop trying to identify data stream associated with the telephone call, and providing the identifying information to the NAs; and

means for, after receipt of the message from the NTC, and in accordance with the identifying information provided by the received message, collecting quality of service data by the NAs for data streams associated with the telephone call and transmitted through the communication lines, and providing quality of service information by the NAs to the NTC based on the collected quality of service data.

18. (Original) An apparatus as in claim 17, wherein the telephone call is based on Session Initialization Protocol (SIP).

19. (New) The method of claim 3, further comprising, before the step of collecting the quality of service data:

after receipt of the telephone number by each NA, monitoring call control information by each NA on the corresponding communication line in accordance with the telephone number to try to identify a data stream associated with a telephone call having the telephone number as a source or destination;

transmitting, by a first NA of the NAs to identify the data stream, identifying information of the identified data stream to the NTC; and

after receipt of the transmitted identifying information, communicating between the NTC and the NAs so that each NA has the identifying information.

20. (New) The method of claim 19, wherein the telephone call is based on Session Initialization Protocol (SIP).

21. (New) The method of claim 3, further comprising prior to transmitting the respective telephone number from the NTC to the plurality of NAs, the NTC selecting the plurality NAs from among a larger superset of NAs and not transmitting the respective telephone number from the NTC to NAs of the superset that are not selected.

22. (New) The method of claim 21, wherein the NTC selects from the superset NAs which monitor lines associated with the telephone number, and does not select from the superset NAs which do not monitor lines associated with the telephone number.

23. (New) The apparatus of claim 11, wherein:

the NTC transmits a respective telephone number to the NAs;

after receipt of the transmitted information, each NA monitors call control information on the corresponding communication line in accordance with the received information;

a first NA of the NAs to identify a data stream associated with a telephone call having the telephone number as a source or destination transmits identifying information of the identified data stream to the NTC; and

after receipt of the transmitted identifying information, the NTC communicates with the NAs so that each NA has the identifying information.

24. (New) The apparatus of claim 23, wherein the telephone call is based on Session Initialization Protocol (SIP).